

Guest Editorial Preface

Special Issue on Educational Trends and Best Practices for Engineering Education

Souhaib Aammou, Abdelmalek Essaâdi University/ENS, Tétouan, Morocco

Youssef Jdidou, Abdelmalek Essaâdi University, Tétouan, Morocco

The accelerated pace of technological development worldwide calls for the renewal of education systems to improve the quality of teaching and learning for skills development through the effective use of information and communication technologies (ICTs). Indeed, the transformation of the world towards the information society or the knowledge society on educational systems. In fact, the educational systems of all countries are broadened, to become more flexible and to improve their relevance and quality at all levels. Morocco, like all developing countries, has understood the importance of the use and integration of ICT in its educational system since 2005.

For this reason, the main aim of TICET event is to bring together educational experts under a common objective: to generate innovative ideas to be applied to education and to promote international cooperation and partnership.

This special issue saw a variety of currently interesting topics in education and technology focused on the exchange of relevant trends and research results as well as the presentation of practical experiences in technology use in education.

In this regard, the first article entitled “Learning Through Massive Open Online Courses Platforms Based on Fuzzy Analytic Hierarchy Process” proposes a framework to improve teaching effectiveness, facilitate learning among learners, encourage long life learning and maximize motivation as well as reducing the dropout rates by using Fuzzy Analytic Hierarchy Process algorithm (Fuzzy-AHP) to determine the triangular weight of the courses from the most widespread MOOCs in the literature. Weights of the courses are calculated by fuzzy numbers in line with the learning profile.

The second article entitled “Social constructivism and digital learning” analyzes the different pedagogical models of distance learning in order to identify the most appropriate model to distance learning system, the goal is to show the relevance of the adoption of model in distance learning.

The third article entitled “How Moroccan Secondary School Students Classify Animals” aims to highlight Moroccans student alternative conceptions, regarding animal classification, of secondary school students and to elicit their ability to classify some animals.

The last article entitled “MOLPP, a new generic approach to design a system for monitoring player progress in Serious Games” propose a monitoring system called MOLPP (Monitoring Learner – Player Progress in Serious Games) which adopts a new generic approach based mainly on Anderson’s ACT-R theory. The MOLPP system implements the Model Tracing diagnostic methodology to analyze learner-player interactions from the Serious Game environment and match these interactions with the performance model, in order to generate a corrective intervention pertaining to the evaluation mode in the form of immediate feedback by complying with all the production rules of the performance model.

Finally, using technology in education can increase educational productivity by accelerating the rate of learning; reducing costs associated with instructional materials or program delivery; and better utilising teacher time.

The most important message of this issue is not just the need to see information technology as a strategic driver. It is that the effective executive in this new world must see technology as a catalyst for educational system.

Souhaib Aammou

Youssef Jdidou

Guest Editors

IJSEUS